

Maryland Road Overheating Strategy: Cooling Hierarchy Addendum

This addendum should be read in conjunction with the Part O Overheating report and outlines how the proposed development has incorporated the cooling hierarchy in the design.

#	Cooling Hierarchy measure	Implementation of measure	Measure effect
1	Reduce the amount of heat entering a building through orientation, shading, high albedo materials, fenestration, insulation and the provision of green infrastructure	- Solar control glazing to limit solar gains. - Balcony overhangs providing shading - Deep window reveals to provide local shading	Reduction in solar gains entering the dwellings
2	Minimise internal heat generation through energy efficient design	- This can be achieved by measures such as fully insulated pipework. - Low energy lighting with reduced heat gains	N/A
3	Manage the heat within the building through exposed internal thermal mass and high ceilings	- At the jurisdiction of the site architect - Use of elements with high thermal mass	N/A
4	Provide passive ventilation	- Passive ventilation via unrestricted opening windows and balcony doors (as permitted by ADO and ADK) - Ensure that easily accessible windows are made secure for nighttime opening	Ensures compliance with Part O/TM59.
5	Provide mechanical ventilation	- Mechanical ventilation via extract systems to bathrooms/kitchens - MVHR potential where there are noise restrictions	Limited impact on internal temperatures. Mechanical ventilation rates alone not sufficient for compliance.
6	Provide active cooling systems	Mechanical cooling strategy only if passive measures cannot be implemented.	All assessed rooms satisfy TM59 criteria